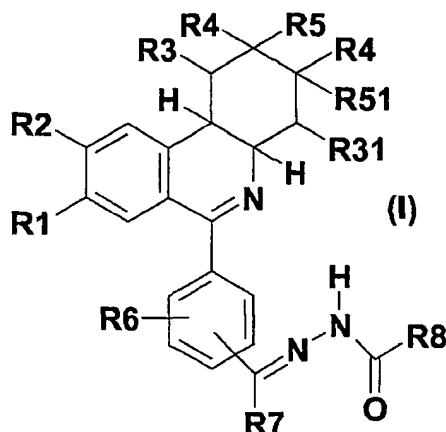


Patent Claims

1. Compounds of the formula I,



in which

- R1 is hydroxyl, 1-4C-alkoxy, 3-7C-cycloalkoxy, 3-7C-cycloalkylmethoxy or completely or predominantly fluorine-substituted 1-4C-alkoxy,
- R2 is hydroxyl, 1-4C-alkoxy, 3-7C-cycloalkoxy, 3-7C-cycloalkylmethoxy or completely or predominantly fluorine-substituted 1-4C-alkoxy,
- or in which R1 and R2 together are a 1-2C-alkylenedioxy group,
- R3 is hydrogen or 1-4C-alkyl,
- R31 is hydrogen or 1-4C-alkyl,
- or in which R3 and R31 together are a 1-4C-alkylene group,
- R4 is hydrogen or 1-4C-alkyl,
- R5 is hydrogen,
- R51 is hydrogen,
- or in which R5 and R51 together represent an additional bond,
- R6 is hydrogen, halogen, nitro, 1-4C-alkyl, trifluoromethyl or 1-4C-alkoxy,
- R7 is 1-4C-alkyl, 3-7C-cycloalkyl, 3-7C-cycloalkylmethyl, pyridinyl, phenyl or R71- and/or R72-substituted phenyl, wherein
- R71 is halogen, hydroxyl, cyano, trifluoromethyl, carboxyl, nitro, 1-4C-alkyl or 1-4C-alkoxy,
- R72 is 1-4C-alkoxy,
- R8 is 1-4C-alkyl, hydroxy-1-4C-alkyl, 1-4C-alkoxy-1-4C-alkyl, amino, C(O)N(H)R9, phenyl, HetA, aryl-1-4C-alkyl, HetB-1-4C-alkyl, cyano-1-4C-alkyl, 1-4C-alkoxycarbonyl-1-4C-alkyl or R14- and/or R15- and/or R16-substituted phenyl, wherein
- R9 is hydrogen, phenyl or R91- and/or R92-substituted phenyl, wherein
- R91 is halogen, 1-4C-alkyl, 1-4C-alkoxy, nitro, trifluoromethyl or completely or predominantly fluorine-substituted 1-4C-alkoxy,
- R92 is halogen or 1-4C-alkoxy,

- HetA is an unsubstituted or R10- and/or R11-substituted heteroaryl radical which is selected from the group consisting of pyrrolyl, furanyl, thiophenyl, pyrazolyl, imidazolyl, oxazolyl, isoxazolyl, thiazolyl, isothiazolyl, thiadiazolyl, pyridinyl, pyrimidinyl, pyrazinyl and pyridazinyl, wherein
- R10 is 1-4C-alkyl, phenyl, halogen or trifluoromethyl,
- R11 is 1-4C-alkyl,
- aryl is phenyl or R12- and/or R13-substituted phenyl, wherein
- R12 is 1-4C-alkyl, 1-4C-alkoxy, halogen, nitro or hydroxyl,
- R13 is 1-4C-alkoxy or halogen,
- HetB is an unsubstituted or R12- and/or R13-substituted indolyl radical,
- R14 is 1-4C-alkyl, trifluoromethyl, 1-4C-alkoxy, halogen, nitro, hydroxyl, amino, mono- or di-1-4C-alkylamino or completely or predominantly fluorine-substituted 1-4C-alkoxy,
- R15 is 1-4C-alkyl, 1-4C-alkoxy, halogen or completely or predominantly fluorine-substituted 1-4C-alkoxy,
- R16 is 1-4C-alkoxy,
- and the salts and the E/Z isomers of these compounds.

2. Compounds of the formula I as claimed in claim 1, in which

- R1 is 1-2C-alkoxy, 3-5C-cycloalkoxy, 3-5C-cycloalkylmethoxy or completely or predominantly fluorine-substituted 1-2C-alkoxy,
- R2 is 1-2C-alkoxy, 3-5C-cycloalkoxy, 3-5C-cycloalkylmethoxy or completely or predominantly fluorine-substituted 1-2C-alkoxy,
- R3 is hydrogen,
- R31 is hydrogen,
- R4 is hydrogen or 1-2C-alkyl,
- R5 is hydrogen,
- R51 is hydrogen,
- or in which R5 and R51 together represent an additional bond,
- R6 is hydrogen,
- R7 is 1-4C-alkyl or phenyl,
- R8 is 1-4C-alkyl, hydroxy-2-4C-alkyl, amino, C(O)N(H)R9, phenyl, HetA, aryl-1-2C-alkyl, HetB-1-2C-alkyl, cyano-1-2C-alkyl, 1-4C-alkoxycarbonyl-1-2C-alkyl or R14- and/or R15- and/or R16-substituted phenyl, wherein
- R9 is hydrogen, phenyl or R91-substituted phenyl, wherein
- R91 is halogen,
- HetA is an unsubstituted or R10-substituted heteroaryl radical which is selected from the group consisting of pyrrolyl, furanyl, pyrazolyl, thiadiazolyl and pyridinyl, wherein
- R10 is 1-4C-alkyl,
- aryl is phenyl or R12- and/or R13-substituted phenyl, wherein

R12 is 1-4C-alkoxy,
R13 is 1-4C-alkoxy,
HetB is an unsubstituted or R12- and/or R13-substituted indol-3-yl radical,
R14 is 1-4C-alkyl, trifluoromethyl, 1-4C-alkoxy, halogen, nitro, hydroxyl, amino, mono- or di-1-4C-alkylamino or completely or predominantly fluorine-substituted 1-2C-alkoxy,
R15 is 1-4C-alkoxy or completely or predominantly fluorine-substituted 1-2C-alkoxy,
R16 is 1-4C-alkoxy,
and the salts and the E/Z isomers of these compounds.

3. Compounds of the formula I as claimed in claim 1, in which

R1 is methoxy,
R2 is methoxy,
R3, R31, R4, R5 and R51 are hydrogen,
R6 is hydrogen,
R7 is methyl or phenyl,
R8 is methyl, hydroxypropyl, amino, C(O)N(H)R9, phenyl, HetA, arylmethyl, indol-3-ylmethyl, cyanomethyl, ethoxycarbonylmethyl or R14- and/or R15- and/or R16-substituted phenyl, wherein
R9 is hydrogen or R91-substituted phenyl, wherein
R91 is fluorine,
HetA is an unsubstituted furanyl, pyrrolyl or pyridinyl radical, a R10-substituted thiadiazolyl radical or a R10-substituted pyrazolyl radical, wherein
R10 is methyl,
aryl is phenyl or R12- and/or R13-substituted phenyl, wherein
R12 is methoxy,
R13 is methoxy,
R14 is methyl, trifluoromethyl, methoxy, fluoro, chloro, nitro, hydroxyl, amino or dimethylamino,
R15 is methoxy,
R16 is methoxy,
and the salts and the E/Z isomers of these compounds.

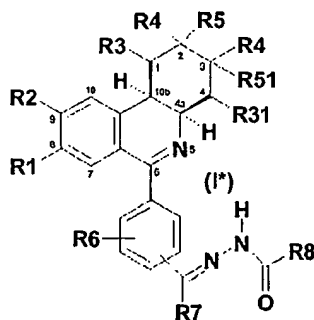
4. Compounds of the formula I as claimed in claim 1, in which
either

R1 is methoxy,
R2 is methoxy,
R3, R31, R4, R5 and R51 are hydrogen,
R6 is hydrogen,
R7 is methyl,

- R8 is methyl, hydroxypropyl, amino, C(O)N(H)R9, phenyl, HetA, 3-methoxyphenyl, 4-chlorophenyl, 4-nitrophenyl, 4-hydroxyphenyl, 4-aminophenyl, 4-methylphenyl, 3-chlorophenyl, 3-nitrophenyl, 3,4-dimethoxyphenyl, 3,4,5-trimethoxyphenyl, 4-dimethylaminophenyl, 4-methoxyphenyl, 4-trifluoromethylphenyl, 4-fluorophenyl, arylmethyl, indol-3-ylmethyl, cyanomethyl or ethoxycarbonylmethyl, wherein
- R9 is hydrogen or 4-fluorophenyl,
- HetA is 1H-pyrrol-2-yl, pyridin-4-yl, furan-2-yl, pyridin-3-yl, 3-methyl-1H-pyrazol-5-yl or 4-methyl[1,2,3]thiadiazol-5-yl,
- aryl is phenyl, 4-methoxyphenyl or 3,4-dimethoxyphenyl,
- or
- R1 is methoxy,
- R2 is methoxy,
- R3, R31, R4, R5 and R51 are hydrogen,
- R6 is hydrogen,
- R7 is phenyl,
- R8 is methyl or amino,
- and the salts and the E/Z isomers of these compounds.

5. Compounds of the formula I according to either claim 1, 2, 3 or 4 in which the hydrogen atoms in positions 4a and 10b are in the cis position relative to one another, and the salts and the E/Z isomers of these compounds.

6. Compounds of the formula I according to either claim 1, 2, 3 or 4 which have with respect to the positions 4a and 10b the configuration shown in formula I*:



and the salts and the E/Z isomers of these compounds.

7. Compounds of the formula I as claimed in claim 1 for use in the treatment or prevention of diseases.

8. A pharmaceutical composition comprising one or more compounds of the formula I as claimed in claim 1 together with customary pharmaceutical excipients and/or vehicles.
9. The use of compounds of the formula I as claimed in claim 1 and/or their pharmacologically acceptable salts for the production of pharmaceutical compositions for treating or preventing respiratory disorders and/or dermatoses.
10. A method for treating illnesses in a patient comprising administering to said patient a therapeutically effective amount of a compound of the formula I as claimed in claim 1.
11. A method for treating airway disorders in a patient comprising administering to said patient a therapeutically effective amount of a compound of the formula I as claimed in claim 1.